### **FEASIBILITY STUDY**

# **High Point**

Piedmont Parkway Extension From SR 1552 (Tarrant Rd.) to SR 1541 (Wendover Ave.) Guilford County

**Division 7** 

FS-9907B

Prepared by the
Programming and TIP Branch
Division of Highways
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# High Point Piedmont Parkway Extension From SR 1552 (Tarrant Rd.) To SR 1541 (Wendover Ave.) Guilford County FS-9907B

# I. General Description

This feasibility study describes constructing an extension of the Piedmont Parkway from SR 1552 (Tarrant Rd.) to SR 1541 (Wendover Ave.), a distance of 1.0 miles (1.6 km). The project location is shown on Figure 1. The studied cross-section is a four-lane divided curb and gutter section with 12-foot (3.7-m) lanes, a 28-foot (8.5-m) raised median, and 10-foot (3.0-m) berms on 120 feet (36.6 m) of right-of-way with no access control. The studied cross-section matches the cross-section on the existing portions of the Piedmont Parkway. It is anticipated that there will be one residence and no businesses relocated due to this project. The total cost of the project, including construction and right-of-way, is estimated to be \$5,300,000.

This study is the initial step in the planning and design process for this project and is not the product of exhaustive environmental or design investigations. The purpose of this study is to describe the proposed project including costs, and to identify potential problems that may require consideration in the planning and design phases.

# II. Need for Project

The purpose of this project is to construct the remaining link in the Piedmont Parkway, which is an east-west corridor linking northeast High Point and southeast Greensboro. This project is supported by the City of High Point.

The Piedmont Parkway extension is designated as proposed major thoroughfare in the Greensboro Urban Area Thoroughfare Plan. The existing Piedmont Parkway outside the project limits is a four-lane divided curb and gutter section with 12-foot (3.7-m) lanes, a 28-foot (8.5-m) raised median, and 10-foot (3.0-m) berms on 100 feet (30.5 m) of right-of-way with no access control.

Development in the vicinity of the western project terminus is characterized by office buildings and industrial facilities. Development near the eastern project terminus includes a shopping center and several residential subdivisions. If constructed, this project will provide access to a local quarry and proposed office, industrial and residential development.

There is an existing traffic signal at the intersection of Piedmont Parkway and Wendover Avenue. There is also an existing flashing signal the intersection of Piedmont Parkway and Tarrant Road.

The projected 1998 Average Daily Traffic (ADT) along the proposed Piedmont Parkway extension is 6,000 vehicles per day (vpd). For the design year 2025, the estimated traffic volumes on the proposed Piedmont Parkway extension will be 17,200 vpd. Truck traffic is estimated to make up five percent of daily traffic.

If the proposed Piedmont Parkway extension is constructed as a four-lane divided curb and gutter section with a raised median, the facility will operate at LOS A in the current year and at LOS D in the design year 2025. Future capacity on this arterial is limited by poor operation at the intersection with Wendover Avenue. Wendover Avenue is a four-lane divided roadway and is projected to carry 33,800 vehicles in the design year. If Wendover Avenue is widened to a six-lane cross-section, the Piedmont Parkway intersection will improve, allowing the Piedmont Parkway extension to operate at LOS B in the design year.

### III. Description of Project

It is proposed to construct the Piedmont Parkway extension from SR 1552 (Tarrant Rd.) to SR 1541 (Wendover Ave.), a distance of 1.0 miles (1.6 km). The project location is shown on Figure 1. The studied cross-section is a four-lane divided curb and gutter section with 12-foot (3.7-m) lanes, a 28-foot (8.5-m) raised median, and 10-foot (3.0-m) berms on 120 feet (36.6 m) of right-of-way with no access control. The studied cross-section matches the cross-section on the existing portions of the Piedmont Parkway.

It is anticipated that a double 8-foot by 8-foot (2.4-m x 2.4-m) reinforced concrete box culvert will be required to cross Long Branch.

It is anticipated that one residence and no businesses will be relocated due to the project. The total cost of the project is as follows:

Construction\$ Right-of-way\$	
Total Cost\$	5,300,000

### IV. Additional Comments

A transportation benefit analysis was conducted for this project. It is estimated that the total transportation benefits between the current year and the design year (2025) for a four-lane divided facility are \$55,000,000, which is an average of \$2,115,000 per year. The total benefits include accident cost savings, time cost savings, and operating cost savings.

An environmental screening was not conducted for this study. However, no impacts to historic properties or wetlands are anticipated. This project is within a water supply watershed area.

Based on maps at the Department of Environment, Health & Natural Resources - Natural Heritage Section, no threatened or endangered species were identified in the project corridor.

This section of Long Branch within the project corridor is a Class WS-IV stream and is part of the Cape Fear River Basin.

No special accommodation for bicycles is recommended on this project.

